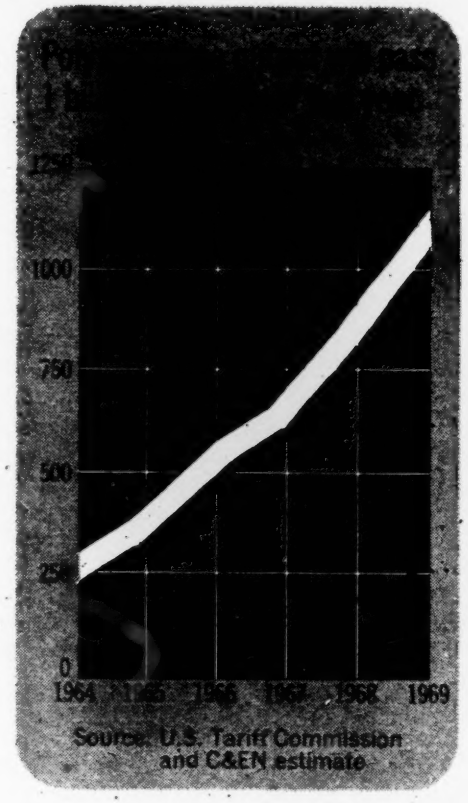
ROUND WON IN PP PATENT TANGLE

The Canadian Patent Office has awarded Dr. Alex Zletz priority of invention for the composition of matter patent on polypropylene. Dr. Zletz is an employee of American Oil Co. and the ruling brings parent Standard Oil (Ind.) a step forward in the contest for ownership of the valuable patent. It is only a first-round victory, however, since other disputants in the case will almost certainly appeal the patent commissioner's ruling in the courts.

Law and chemistry combine to make for confusion where polypropylene patents are concerned. The Canadian Patent Office ruling therefore is the subject of much discussion in the U.S. chemical industry despite the fact that the two patent systems are different and independent.

The question of just who owns the basic patent on polypropylene in the U.S. hasn't been decided either. In fact, infringement proceedings in the U.S. Patent Office have continued for 10 years. As is the case in Canada, any decision can be appealed and lawyers could stay busy for a long time. At stake are licensing fees on a plastic whose U.S. production is valued at about $200 million this year.

Other principals in the Canadian action have six months to appeal the commissioner's finding. Phillips, Du Pont, Montecatini, and Indiana Standard are among the parties in conflict in Canada. Phillips says it doesn't consider the case closed at this point. Du Pont says it is studying whether to appeal or not and a spokesman for Montecatini in the U.S. says he believes appeal is likely. In the event no appeal is lodged, however, a patent would issue to Indiana Standard and the firm would have won royalty rights to crystalline polypropylene produced in Canada.



Dr. Zletz is project manager at American Oil Co.'s Whiting, Ind., lab. His work, which was performed in 1950, covered normally solid crystalline polymers of polypropylene characterized by means of certain infrared absorption bands. Six of nine claims in conflict were awarded to Dr. Zletz in Ottawa.

In the U.S., Du Pont, Phillips, Indiana Standard, and Montecatini are in interference proceedings at the Patent Office over the basic composition of matter patent on polypropylene. Hercules, though not directly involved in the interference proceedings, is in a position to rejuvenate its claim through the courts. Should Indiana Standard emerge as the victor in the legal maze confronting the contesting firms, it has already agreed to license its polypropylene technology.

American Oil and its parent Standard Oil (Ind.) signed a consent order to settle a Federal Trade Commission complaint challenging American Oil's acquisition of Avisun in January 1968. Under terms of the agreement, American Oil agreed to license polypropylene and polypropylene film patent rights and technical information for 10 years (C&EN, June 10, 1968, page 51).

A Montecatini patent for isotactic polypropylene further complicates the overall basic patent issue. The firm was granted U.S. Patent 3,112,300 in 1963 and as a result has filed infringement suits against Chevron Chemical, Avisun, Rexall Drug, and Humble Oil and Refining (C&EN, Feb. 28, 1966, page 26). Du Pont and Montecatini concluded an agreement in 1963 whereby each company obtained a nonexclusive license under U.S. patent rights of the other in the polypropylene field. Hercules is a Montecatini licensee.

Polypropylene production has climbed 35% per year compounded during the 1964–68 period.

A number of firms plan expansions to meet demand in the early 1970's. Enjay Chemical Co. says it will increase capacity to 300 million pounds annually by the second half of 1970. The expansion will be made at Baytown, Tex. The firm's 1967 total capacity was 150 million pounds.

By 1971, Hercules will bring on stream a 180 million pound-per-year polypropylene plant at Lake Charles, La. Lake Charles capacity is presently 370 million pounds per year. Avisun will construct a 150 million pound-per-year polypropylene plant at Chocolate Bayou, Tex., due on stream in 1970. An expansion at New Castle, Del., gives Avisun a 250 million pound-per-day capacity at that site (C&EN, April 14, page 15).